

# EFMI WG EVAL

## Assessment of Health Information Systems

### Chair:

**Elske Ammenwerth**, UMIT - University for Health Sciences, Medical Informatics and Technology, Hall in Tyrol, Austria  
*E-mail:* elske.ammenwerth@umit.at

### Co-Chair:

**Pirkko Nykänen**, School of Information Sciences, Tampere University, Finland, *E-mail:* pirkko.nykanen@uta.fi

**Jytte Brender**, Dept. of Health Science and Technology, Aalborg University, Denmark, *E-mail:* jytte@brender.dk

*Website:* <https://iig.umit.at/efmi/>

## Main Objectives:

Information and communications technologies (ICTs) are being used increasingly in health care. It is evident that the use of modern ICT offers tremendous opportunities to reduce clinical errors, to support health care professionals, and to increase the efficiency of care. However, there are also hazards associated with such technologies. Therefore, rigorous, generalizable evaluations of ICT applications in health care are absolutely necessary. Therefore, the aims of the working group are:

- to foster transdisciplinary dialogues between experts from informatics, medical informatics, economics, health care, health services research, clinical epidemiology, biometry, psychology, sociology, ethnography, organizational development, operations research and other evaluation fields, on a European level, and to encourage exchange on methodological issues between researchers from different traditions;
- to offer an opportunity to share knowledge with the aim of obtaining profitable cross-fertilization among different fields of expertise and especially between quantitative and qualitative research;
- to promote a combined research agenda to develop frameworks and toolkits for information systems evaluation, offering guidelines for an adequate combination of evaluation methods and tools;
- to discuss and clarify the networking needs for long-term evaluation research in medical informatics, and to promote combined research proposals at a European level.

## Relevant Activities 2015:

- Together with the IMIA WG "Technology Assessment and Quality Development", the AMIA WG "Evaluation" and the EFMI WG "Education in Health Informatics", the WG organized a workshop at MIE 2015 in Madrid entitled "Courses on Health IT Evaluation: Development of Recommendations". This workshop continued the discussions on recommendations for health IT evaluation courses.
- Together with the AMIA WG "Evaluation", the AMIA WG "People and Organizational Issues", the AMIA WG "Education" and the IMIA WG "Technology Assessment and Quality Development", the WG organized the workshop "Biomedical and Health Informatics Curricula: Development of Recommendations for Evaluation Courses" at AMIA 2015. This workshop continued the discussions on recommendations for health IT evaluation courses.
- Together with the IMIA WG "Technology Assessment and Quality Development", the WG organized a workshop entitled "Courses on Health IT Evaluation: Development of Recommendations" at Medinfo 2015 in Sao Paolo. This workshop continued the discussions on recommendations for health IT evaluation courses.
- Together with the IMIA WG "Technology Assessment and Quality Development", the WG organized a workshop entitled "Why evidence-based health informatics should have theoretical foundations: Exploring the implications for policy and evaluation" at Medinfo 2015 in Sao Paolo.
- The WG initiated, organized and edited a book on "Evidence-Based Health Informatics". More than 50 international authors contributed to this book. This book is published by IOS Press, Amsterdam, and is expected on the market by autumn 2016.
- The WG provided a position paper entitled "Improving evaluation to address the unintended consequences of health information technology: a position paper from the Working Group on Technology Assessment & Quality Development" submitted to the IMIA Yearbook of Medical Informatics 2016.
- The bibliography on health IT Evaluation was maintained and is available at <https://iig.umit.at/efmi/bibliography.htm>. The list contains journal papers and books considered as milestone publications.
- The web-based Health IT Evaluation Inventory was maintained. It now comprises around 1.850 abstracts of evaluation papers in health informatics that can be retrieved. It also allows researchers from all over the world to submit papers for inclusions. The Health Evaluation Inventory is available for free at <http://evaldb.umit.at>.

## Activities planned for 2016:

- Publishing the book "Evidence-Based Health Informatics" ( IOS Press).
- Publication of a paper entitled "Theoretical foundations for evidence-based health informatics: Why? How?"
- Presentation of a paper entitled "Recommendations for Health IT Evaluation Training as a Key Prerequisite to Obtaining Evidence" to MIE 2016.
- Organization of a workshop on economic evaluation at MIE 2016.
- Further strengthening of the links to the sister WGs of AMIA and IMIA by joint activities
- Further update of the health IT Evaluation Inventory.

## Relevant Publications 2015:

- Rigby M, Georgiou A, Hyppönen H, Ammenwerth E, de Keizer N, Magrabi F, Scott P. Patient Portals as a Means of Information and Communication Technology Support to Patient- Centric Care Coordination - the Missing Evidence and the Challenges of Evaluation. A joint contribution of IMIA WG EVAL and EFMI WG EVAL. Yearb Med Inform. 2015;10(1):148-59.